Methods of Measuring Health Literacy of Children

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NUI Galway

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Content of the Presentation

RATIONALE & BACKGROUND
OBJECTIVES
METHODOLOGY
SUMMARY & CONCLUSION

People

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Health Literacy in Childhood and Adolescence
Methods of Measuring Health Literacy of Children (HLCA-MoMChild)

- Child and Adolescent Health Literacy Research in HLCA project Germany

- Start date 03/2015 – 03/2018

- 10 Subprojects, including Synthesis Project

- Funded by the Federal Ministry of Education and Research (BMBF)

- Collaborative team science with partners from various fields, e.g. Education, Psychology, Sociology, Public Health

- Aiming at research in general Health Literacy, Mental Health Literacy and eHealth Literacy

- Mostly all projects will develop conceptual frameworks, tools and conduct surveys
Health Literacy in Childhood and Adolescence (HLCA)

A Target for Health Promotion and Primary Prevention
Health Literacy in Childhood and Adolescence
Methods of Measuring Health Literacy of Children (HLCA-MoMChild)

Project Background in a Nutshell

• **What:** Tool development & validation

• **Who:** Target population children 9-10 years old

• **How:** Mixed Methods, Qualitative & Quantitative

• **Where:** Germany
Project Background in a Nutshell - Why

- Child and adolescent measures are not well developed compared to adult tools
- Most tools quest populations 15 y.o.++
- No adequate frameworks or models that can be translated into tools

MoMChild Target Population

Children 9-10 y.o. are crucial for health literacy research, their needs and their balance between autonomy and heteronomy differ from adults and adolescents

- Transition; secondary school
- Autonomy and personality development
- Cognitive, emotional, physical development
MoMChild Objectives

• Development of a valid questionnaire underpinned with a sound model and definition to assess health literacy levels of children 9-10y

• Development of a Milieu Typology related to the childrens life worlds (class-related lifestyles)

• Measuring Health Literacy of primary school children
Some Challenges when doing Health Literacy research with/in the Child Population

- Stage of life
- Childrens Worlds -> lifestyles?
- Content and context specific factors; what is important?
- How can an instrument adequately address children?
- Children`s participation?
<table>
<thead>
<tr>
<th>Stage</th>
<th>Description</th>
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<tbody>
<tr>
<td>1. Developmental Stage I</td>
<td>Concept Clarification and Survey Development</td>
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<tr>
<td>2. Qualitative Pilot</td>
<td>Cognitive Testing of the preliminary instrument</td>
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<tr>
<td>3. Developmental Stage II</td>
<td>Scale and Variables Modification; Completion of the Tool for Field Test</td>
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<td>4. Field Test Quantitative Stage</td>
<td>Field Test in Schools and pupils</td>
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<tr>
<td>5. Analysis and Refinement I</td>
<td>Statistical treatment and analysis</td>
</tr>
<tr>
<td>6. Analysis and Refinement II</td>
<td>Milieu Typology Development</td>
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<tr>
<td>7. Finalisation</td>
<td>Questionnaire final version</td>
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</table>
Work in Progress:

A systematic literature review (with reflective elements in the methodology) using PubMed, Web of Science, PsycInfo, SSRN, Emerald, ERIC, Science Direct, CINAHL, BioMed Central.

Objectives:
(1) Identification of methodologies and measurements of child/adolescent/adult health literacy,
(2) Creation of a robust knowledge base of the health literacy concept.

<table>
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<tr>
<th>Search Topic</th>
<th>Results</th>
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<tr>
<td>original tools</td>
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<tr>
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<td>recommendation papers</td>
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<tr>
<td>taxonomic papers</td>
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<tr>
<td>target population tools (9-10y.o.)</td>
<td>n=3</td>
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</table>
Tools found for MoMChild Target Population

KidsHealth KidsPoll of Health Literacy of the National Health Education Standards based Tool (Brown et al., 2007, USA) (9-13 y.o.)

GeKoKids Tool: Based on the Nutbeam Typology and Health Promotion Outcome Model (Schmidt et al., 2010, Germany) (9-13 y.o.)

Instruments from Council of Chief State School Officers (CCSSO) State Collaborative on Assessment of Student Standards (SCASS) Health Education Assessment Project (HEAP) (Benham Deal et al., 2010, USA) (8-9 y.o.)
State of the art

No valid questionnaire to assess health literacy in 9-10 years old primary school children that is underpinned with a target population adjusted model and definition

GAP IN VALIDITY-DRIVEN TOOLS
Concept Clarification

Conceptual Framework Development and Understanding of Health Literacy?

Health Literacy

Knowledge

Action

Skills

Health Literacy

Cultural

Social

Cognitive

Life World

Information for

Milieu Typology

Psychographic

characteristics

Beliefs, Values, Attitudes, Interests, Expectations, Consumptions, Leisure

Socio-
demographic

characteristics

Age

Gender

Parents' Education

Immigrant Status

Living Situation

Parents' Ethnicity

Birth Order

Religiosity

SES

Health Status (…)

Further Parts

Self-determination

Quality of Life

Health Behaviour

Self-reported Health
Pierre Bourdieu, Distinctions, 1984

**Practice Theory**

Mediating between Subjectivism and Objectivism

An Approach to dialect between social structures and human agency in a dynamic relationship.
Summary

• Development of a valid Health Literacy Questionnaire for Children 9-10-y.o.

• Based on a Conceptual Framework, including Dispositional Skills and Attitudes (Milieu Typology)

• Challenges and Difficulties

• Literature Review Results, Lack of Instruments for the Target Population

• Understanding of Child Health Literacy

• Including Children to the Research
Health Literacy in Childhood and Adolescence
Methods of Measuring Health Literacy of Children (HLCA-MoMChild)

This is the End!

Thank you!